MODIS-N DESCOPE CANDIDATES (DRAFT/VERY PRELIMINARY 10/92)

NOTE: ALL OPTIONS ARE LISTED IN DECREASING ORDER OF ACCEPTABILITY

SPECIFIC OPTIONS

Comment: Items 1-4 have already been effected.

- 1. (\$0.6M) Specification Paragraph 3.1.4
- 2. (\$0.075M) Specification Paragraph 3.3.5
- 3. (\$0.17M) GIIS
- 4. (0.02M) CRDL 509 5 copies of drawings
- 11. (\$0.5M) 420-05-01: Delete requirement to base and document derived contamination allowance levels on analyses
- 14. (\$0.3M) GSFC must approve NSPARS 420-05-01: Approve NSPARs in-house and provide notification to GSFC
- 10. (\$4.5M) PAR Rev A: Procure selected integrated circuits and hybrids to Grade 2 requirements instead of Grade 1. Cost of Grade 1 parts approximately 4 times that of Grade 2.

Comment: Items 20-24 are in the same category in that the money must be in the early years to be useful.

- 20. (\$5.4M) Procure EEE parts simultaneously for PF, FM1 and FM2
- 21. (\$1.3M) Focal Plane assemblies (FPA's) produced sequentially.: Assemble all flight model FPA's (PF, FM1, FM2, and Spares) and deliver concurrently.
- 22. \$0.35M) Scan mirrors for up through PFM allowed to proceed now.
- 23. (\$1M) Filters up through FM2 now on subcontract: Increase current purchase orders for filters and dichrois to include quantity for FM3, FM4, and FM5
- 24. (\$0.20M) FPA cables for EM and PFM allowed to proceed now.

ELIMINATE BANDS 34 AND 36 -THE REMAINING BANDS (33 AND 35) WOULD BE COMBINED WITH 31 AND 32 FOR GETTING CLOUD TOP PRESSURE AND FRACTION

19. (\$1.2M) Spec 3.3.3, 3.3.4: Remove observing bands 27 and 28 from the AM MODIS; remove bands 33 and 35 from the PM MODIS.

ELIMINATE BANDS 17-19 (LOWER TROPOSPHERIC WATER VAPOR AND CLOUD OPTICAL PROPERTIES BANDS)

RELAX BAND CENTER AND EDGE SPECS

RELAX BAND-TO-BAND MATCHING & STABILITY SPECS

RELAX STABILITY SPECS - RADIOMETRIC, WAVELENGTH

12. (\$3M) Spec 3.4.9.1 Inflight Calibration: Delete radiometric function of SRCA.

15. (\$1.75M) Specification paragraph 3.4.9.3 requires solar diffuser stability monitor (SCSM): Eliminate the requirement for SDSM.

RELAX SNR SPECS ON BANDS 13, 14 BY SQRT(2)

17. (\$3M) Spec requires full performance: Revise the contract so that the specs for PFM, SNR, Polarization, radiometric accuracy and stability, registration and calibration requirements are reduced by 25%. Retain present specs as goals.

ELIMINATE BANDS 33 AND 35
-THIS ELIMINATES CLOUD MORPHOLOGY CAPABILITY TO A LARGE DEGREE.

LOWER RESOLUTION OF 214 m BANDS TO 428 METERS

ELIMINATE BANDS 13 AND 14 (FLUORESCENCE BANDS)

LOWER SPATIAL RESOLUTION OF ALL 428 M BANDS TO 856 m.

REDUCE SNR SPECS ON ALL BANDS TO BIP LEVELS

ELIMINATE REMAINING OCEAN COLOR BANDS AND USE SEAWIFS III

ELIMINATE LAND BANDS (1-7) AND SST BANDS (20-23, 29, 31,32) AND USE AVHRR

-THIS IS TERRIBLE, NO SATISFACTORY CALIBRATION ON AVHRR.

CHUCK THE WHOLE IDEA AND GO FISHING!